INEOS ABS

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July 15, 2011

Attn: Compliance Tracker, AE-17J
Air Enforcement and Compliance Assurance Branch
U.S. Environmental Protection Agency Region 5
77 West Jackson Boulevard
Chicago, Illinois 60604

RE: Consent Decree Civil Action No. 1:09-CV-545
Effective Date February 4, 2010

Dear Sirs:

Please find attached the Semiannual Report for the First Half 2011. Please contact me at (513) 467-2470 or michele.smith@ineos.com if you have any questions concerning the submitted information.

Respectfully Submitted,

Michele A. Smith, P.E.
Lead Environmental Engineer
INEOS ABS (USA) Corporation

cc: M. Palmero, USEPA Region 5
T. Kalman, OEPA
G. Bachmann, Ohio AG
M. Kramer, HCDOES

INEOS ABS (USA) CORPORATION'S ADDYSTON, OH PLANT
CONSENT DECREE SEMIANNUAL REPORT

Consent Decree Civil Action No. 1:09-CV-545
Effective Date February 4, 2010

Reporting Period: 01/01/11 – 06/30/11

I. INTRODUCTION

The following report contains the required information about INEOS ABS' compliance activities associated with the requirements in Paragraph 50 a. and 50 b. in the Consent Decree.

II. COMPLIANCE REQUIREMENTS

Per Section VI (Compliance Requirements) of the Consent Decree, INEOS ABS met the following compliance requirements:

A. FLARE COMPLIANCE REQUIREMENTS

1. Steam-to-Vent Gas Ratio < 3.6 to 1 as a 1-hour Block Average (Paragraph 18 a.)
   No deviations in the first half of 2011.
2. Net Heating Value of Vent Gas > 385 BTU/scf as a 1-hour Block Average (Paragraph 18 b.)
   This is no longer a requirement.
3. NHVFG > 200 BTU/scf as a 1-hour Block Average (Paragraph 19)
   No deviations in the first half of 2011.
4. Flare Monitoring Requirements (Paragraph 20 & 23)
   Required data was measured, calculated, and recorded at all times that the Process P001 Flare was in operations and reports were submitted monthly and quarterly as stated in the Quarterly Reports.
5. Flare Monitoring Instruments Standard Operating Procedure (SOP) (Paragraphs 21 & 22)
   The SOP was submitted on March 5, 2010. Conditional approval from U.S. EPA was received on June 7, 2010. INEOS ABS submitted a Notice of Dispute on June 24, 2010, which has yet to be resolved.
6. Passive FTIR (Paragraph 24)
   The Passive FTIR Work Plan was submitted August 17, 2009 and a revised Passive FTIR Work Plan was submitted September 28, 2009. The U.S. EPA approved the Passive FTIR Work Plan on October 28, 2009. The testing was performed November 3 through November 5, 2009. The Passive FTIR Test Report was submitted on July 6, 2010, and a Supplemental Report was submitted on August 6, 2010.
7. P001 Process Evaluations (Paragraph 25)
   Two evaluations were sent to Hamilton County Department of Environmental Services (HCDES) for detections of 1,3-butadiene on March 4, 2011 and April 27, 2011. The evaluation for the March 4th sample was sent seven days late as explained in Part IV.D. below. The evaluation for the April 27th sample was sent within the 15-day requirement.

B. BIOFILTER PROJECT

1. Biofilter Work Plan (Paragraph 28)
   The Biofilter Work Plan was submitted on March 19, 2010 and approved by Ohio EPA on April 14, 2010.
2. Biofilter Operations and Monitoring Plan (Paragraph 28 a.)
   The Biofilter Operations and Monitoring Plan was submitted on April 18, 2011.
3. Quarterly Deviation Reports (Paragraph 28 b.)
   Quarterly reports are not required until construction and emission testing is completed and a permit is received. The Permit-to-Install application was submitted on May 16, 2011.
4. Biofilter Installation Schedule (Paragraph 29)
   Construction of Phase I of the Biofilter was completed on December 2, 2010. Construction of Phase II was completed on June 24, 2011.

C. EMISSION UNIT P035 SCRUBBER PROJECT

This emission unit continues to be idle and hence there are no compliance requirements for this project (Paragraphs 30 & 31).

D. MAIN DUCT LEAK DETECTION AND REPAIR (LDAR) STANDARD OPERATING PROCEDURE (SOP)

The Main Duct LDAR SOP was submitted for approval on March 5, 2010 and the first inspection using this SOP was performed on June 25, 2010.
The Main Duct LDAR SOP was approved by the U.S. EPA on July 26, 2010 with comments. A revised Main Duct LDAR SOP was submitted on September 8, 2010. This revised Main Duct SOP was implemented during the 2011 Main Duct yearly inspection performed on June 30, 2011.

E. ENHANCED LEAK DETECTION AND REPAIR (APPENDIX A)

1. Part A: General
   A written facility-wide LDAR Program Plan was written by May 4, 2010. The Plan was reviewed and updated on December 29, 2010.
2. Part B: Monitoring Frequency
   Monitoring frequencies were increased on January 1, 2010 (prior to the Effective Date of the Consent Decree). There were three instances where monitoring was not performed in the required timeframe. See Part IV.A., B., and C. below for details.
3. Part C: Monitoring Methods and Equipment
   Method 21 is being used to perform monitoring of all Covered Equipment using a Toxic Vapor Analyzer 1000B Flame Ionization Detector attached to a datalogger which directly electronically records the required data. The monitoring data is transferred to an electronic database daily as of January 1, 2010. As of January 1, 2010 (prior to the Effective Date of the Consent Decree), calibration of the LDAR monitoring equipment is being performed per Method 21 and calibration drift assessment are performed prior to and completion of each monitoring shift.
4. Part D: LDAR Action Levels
   Lower leak repair action levels were implemented on January 1, 2010 (prior to the Effective Date of the Consent Decree).
5. Part E: Leak Repairs
   As of February 4, 2010, Quasi-Directed Maintenance is being performed during all repair attempts. Twenty leaking valves were repaired in the first

half of 2011. Drill and tap repairs were not performed as there is a significant safety risk to perform drill and tap on valves in HAP service as the materials inside the piping is flammable and/or highly explosive.

6. Part F: Delay of Repair (DOR)
   As of January 1, 2010 (prior to the Effective Date of the Consent Decree), the plant manager or his designee signs all DOR. As of March 5, 2010, the Covered Equipment on the DOR list continues to be monitored at their required frequency.
7. Part G: Equipment Replacement/Improvement Program (ERIP)
   A list of all valves in the LDAR Program was submitted on March 5, 2010. No other requirement in the ERIP is required at this time.
8. Part H: Management of Change (MOC)
   MOC is being completed at the facility. All MOC documentation requires a review by the Environmental Department.
9. Part I: Training
   Initial training was completed in May and June 2010. More detailed training for supervisors was performed on July 22, 2010 and June 28, 2011 and for contractors on July 28, 2010.
10. Part J: Quality Assurance/Quality Control (QA/QC)
    On a daily basis, technicians are certifying that the data collected represents that monitoring performed. Two QA/QC audits were completed on February 24, 2011 and May 31, 2011. Corrective actions are still being addressed from these audits.
11. Part K: LDAR Audits and Corrective Actions
    The LDAR External Audit was completed on August 25, 2010. The Corrective Action Plan for the 2010 external audit was completed on September 21, 2010 and was submitted to U.S. EPA for approval on December 21, 2010. All corrective actions identified in the plan have been completed.
12. Part L: Certification of Compliance
    The 2010 Certificate of Compliance was submitted on February 14, 2011.
13. Part M: Recordkeeping
    All records are being kept as required in Appendix A of the Consent Decree.
14: Part N: Reporting
    The 2010 Compliance Status Report was submitted on January 19, 2011.

F. PERMITS

The Permit-to-Install application for the Biofilter was submitted to the Ohio Environmental Protection Agency on May 16, 2011. No other permits were required to be completed and/or submitted in the first half of 2011 (Paragraphs 35 through 39).

G. CERCLA/EPCRA REQUIREMENTS

1. Spill/Release Reporting Policy (Paragraph 41)
   There was no requirement to revise the policy during the first half of 2011.
2. Reportable Quantity Root cause Analysis (Paragraph 42)
   There have been no reportable quantity air releases in the first half of 2011.
3. Training (Paragraph 43)
   No training was required in the first half of 2011.
4. Program Evaluation and Report (Paragraph 44 through 47)

No evaluation or report was required the first half of 2011. A review of the TRI report for reporting year 2010 was completed on May 31, 2011 (Paragraph 44 b.).

5. Program Evaluation Corrective Actions (Paragraph 48)
   No corrective actions were required in the first half of 2011.

H. AMBIENT AIR MONITORING

INEOS ABS continues to reimburse HCDES for costs associated with the analysis of samples collected at the monitoring location at Meredith Hitchens Elementary School.

III. COSTS INCURRED DURING PERIOD

Per Paragraph 50 a. of the Consent Decree, the following costs were incurred by INEOS ABS during the first half of 2011:

LDAR Technician/Maintenance	$285,000
LDAR Equipment/Database Contract	$6,700
Equipment Replacements (Pumps/Valves)	$57,000
Total	$348,700

IV. NONCOMPLIANCE WITH CONSENT DECREE

Per Paragraph 50 b. of the Consent Decree, INEOS ABS submitted the following letters of noncompliance to the U.S. EPA and Ohio EPA during the first half of 2011:

A. Missed Pump Monitoring – Letter Dated January 18, 2011

In November and December 2010, one process unit was down and all the pumps associated with that process unit were placed Out of Service until January 2011. However, two pumps associated with that process unit were for a piece of equipment that is also used by another process unit that was running. Therefore, these two pumps should have been monitored in November and December 2010. A list has been created that indicates which pumps are common to more than one process unit. This list will be used when process units are down to determine which pumps should be placed Out of Service and which ones need to remain active. This will prevent missed common pump monitoring at the facility.

B. Missed Connector Monitoring – Letter Dated February 18, 2011

Connectors in an area of one process unit (MEK tank and unloading) were not monitored in 2010. These 110 connectors were monitored on February 15, 2011. Connectors at the facility were monitored by an outside contractor. The contractor used the facility Leak Detection and Repair (LDAR) drawings to identify and monitor the connectors. A drawing for this area was not given to the contractor and therefore, they did not complete the monitoring. Upon discovery, an audit was completed to determine if there were any other areas in the facility that had not been monitored; none were found. In addition, a procedure was developed where drawings are checked out to the contractor and then returned after monitoring to ensure all areas have been monitored.

C. Missed Monitoring – Letter Dated March 25, 2011

One pump (#00017) that was on the Delay of Repair list was not monitored when it was brought back into Hazardous Air Pollutant (HAP) service. It was monitored

eleven days after it was brought online. Three valves (#10411, #10412 and #10413) were added into the LDAR Program but had been in existence before 2010. These valves were subsequently monitored on March 24th, March 21st, and March 25th, respectively.

D. Late P001 Process Evaluation – Letter Dated April 26, 2011

Per Paragraph 25., a discussion of an evaluation of the P001 Process is to be completed with Hamilton County Department of Environmental Services (HCDOES) within 15 Days after receiving the monitoring data indicating anything other than a non-detect for 1,3-butadiene. The plant received the monitoring results for the March 4, 2011 sample on March 30, 2011. The discussion with HCDOES was not completed until April 21, 2011 – seven days late.
The monitoring results are received at the plant by one engineer. This engineer relays the monitoring results to another engineer who completes the evaluation if the data indicates anything other than a non-detect. There was a communication gap for this sample analysis. Going forward, the engineer responsible for completing the evaluation will be receiving the monitoring results directly from the laboratory to eliminate any miscommunication.

E. Missed Replacement of Valves in Equipment Replacement/Improvement Program – Letter Dated May 11, 2011

During a critical review of the valves to be replaced or repacked in the Equipment Replacement/Improvement Program, each valve was looked at and challenged to see if a process unit shutdown was actually required. The LDAR Administrator asked production supervisors if their valves could be replaced or repacked without process unit shutdowns. Also at that time, the LDAR Administrator asked site management their position if process unit shutdowns were required. It was then that site management decided that six valves could have been replaced or repacked without the requirement for a process unit shutdown. Historically, these valves would not have maintenance performed on them unless a process unit shutdown was initiated. However, it is technically possible for these valves to be isolated and replaced or repacked. Therefore, these valves should have been replaced or repacked within 30 days of the monitoring event identifying them as leakers. These six valves were replaced on May 13, 2011.

V. CERTIFICATION

I certify under penalty of law that I have examined and am familiar with the information in the enclosed documents, including all attachments. Based on my inquiry of those individuals with primary responsibility for obtaining the information, I certify that the statements and information are, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for knowingly submitting false statements and information, including the possibility of fines or imprisonment pursuant to Section 113(c)(2) of the Act, and 18 U.S.C.§§ 1001 and 1341.

Respectfully Submitted,

Clinton Herring
General Manager, NAFTA
INEOS ABS (USA) Corporation